

REMARKS

This Amendment is submitted in response to the Office Action dated June 4, 2004. In the Office Action, the Patent Office rejected Claims 1, 2 and 6-9 under 35 U.S.C. §103(a) as being unpatentable over *Bunnell* (U.S. Patent No. 5,394,948) in view of *Carrick* (U.S. Patent No. 3,213,946). The Patent Office rejected Claims 24, 28 and 30 under 35 U.S.C. §102(b) as being anticipated by *Kinzebaw et al.* (U.S. Patent No. 5,346,019); and rejected Claims 22 and 31 under 35 U.S.C. §103(a) as being unpatentable over *Kinzenbaw et al.* in view of *Taylor et al.* (U.S. Patent No. 4,725,068). In addition, the Patent Office objected to Claims 3-5 as being dependent upon a rejected base claim.

By the present Amendment, Applicant amended Claims 1, 22, 24, 30 and 31 and added Claims 35-37. Applicant submits that the application is in condition for allowance in view of the amendments and for the reasons that follow. Notice to that effect is requested.

Applicant notes with appreciation that the Patent Office indicated that Claims 10-21, 23, 25-27 and 29 are allowable.

Further, Applicant notes with appreciation that the Patent Office indicated that Claims 3-5 would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Accordingly, Applicant added Claim 35 incorporating the limitations of Claim 3 into Claim 1. Further,

Applicant added dependent Claims 36 and 37. Applicant, therefore, submits that Claims 35-37 are allowable. Notice to that effect is requested.

In the Office Action, the Patent Office rejected Claims 1, 2 and 6-9 under 35 U.S.C. §103(a) as being unpatentable over *Bunnell* (U.S. Patent No. 5,394,948) in view of *Carrick* (U.S. Patent No. 3,213,946). Applicant asserts that the rejection is improper in view of Claim 1, as amended, and for the reasons that follow. Notice to that effect is requested.

Claim 1, as amended, requires an apparatus for separating soil. The apparatus has a frame having a length defined between a first end and a second end. The frame pivots with respect to an axle wherein movement of the first end of the frame in a first direction results in movement of the second end of the frame in a second direction wherein the first direction is opposite to the second direction.

Neither *Bunnell* nor *Carrick*, taken either singly or in combination, teach or suggest a frame which pivots with respect to an axle wherein movement of the first end of the frame in a first direction results in movement of the second end of the frame in a second direction wherein the first direction is opposite to the second direction. *Bunnell* merely teaches a frame having a first end which is moved towards or away from the soil. A second end of the frame in *Bunnell* remains stationary while the first end is

moved. Carrick merely teaches the use of discs on opposite sides of an axle and does not teach a frame which pivots with respect to the axle. Accordingly, one of ordinary skill in the art at the time of Applicant's invention would not have been motivated to combine the teachings of Bunnell with Carrick to achieve the invention as defined in Claim 1.

It is submitted that the question under §103 is whether the totality of the art would collectively suggest the claimed invention to one of ordinary skill in this art. In re Simon, 461 F.2d 1387, 174 USPQ 114 (CCPA 1972).

That elements, even distinguishing elements, are disclosed in the art is alone insufficient. It is common to find elements somewhere in the art. Moreover, most if not all elements perform their ordained and expected functions. The test is whether the invention as a whole, in light of the teachings of the references in their entireties, would have been obvious to one of ordinary skill in the art at the time the invention was made. Connell v. Sears, Roebuck & Co., 722 F.2d 1542, 220 USPQ 193 (Fed. Cir. 1983).

It is insufficient that the art disclosed components of Applicant's invention, either separately or used in other combinations. A teaching, suggestion, or incentive must exist to make the combination made by Applicant. Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1143, 227 USPQ 543, 551 (Fed. Cir. 1988).

In view of the foregoing remarks and amendments, Applicant

respectfully submits the rejections of Claims 1, 2 and 6-9 under 35 U.S.C. §103(a) have been overcome and should be withdrawn. Notice to that effect is requested.

The Patent Office rejected Claims 24, 28 and 30 under 35 U.S.C. §102(b) as being anticipated by *Kinzebaw et al.* (U.S. Patent No. 5,346,019); and rejected Claims 22 and 31 under 35 U.S.C. §103(a) as being unpatentable over *Kinzenbaw et al.* in view of *Taylor et al.* (U.S. Patent No. 4,725,068).

"*Kinzenbaw et al.*, disclose an apparatus for separating soil including a frame, a plurality of discs, a pillar 118 a column 100b inside the pillar, liner 180b and plates 182b inside the pillar supporting the column as shown in figures 3d & 6. The Examiner notes that front cylinder 80 moves to adjust the angle of the frame relative to the soil as viewed from above (see Figure 2 where the frame is pivoted 90 degrees). Concerning Claim 28, the frame 20 has a body defined by a plane. Concerning Claim 30, the movement of the discs as they engage the ground during operation, does not change the position of the axle relative to the frame."

However, Claims 24, 28 and 30 each define features not disclosed by *Kinzenbaw et al.* Independent Claim 24 requires an apparatus for separating soil having a frame. The apparatus has a front cylinder on the frame wherein the front cylinder moves the frame relative to the soil wherein raising of the discs at the first end results in lowering of the discs at the second end with respect to the soil. *Kinzenbaw et al.* do not disclose raising of discs at a first end while discs at a second end are lowered with respect to the soil. In *Kinzenbaw et al.*, the first end and the second end of the frame are raised and lowered simultaneously.

Claim 28 requires tires attached to the frame wherein the tires are positioned between the frame and the soil and wherein the discs are positioned on opposite sides of the tires. The tires remain in contact with the soil independent of a position of the discs. In *Kinzenbaw et al.*, the tires are not attached to a frame which is moved upward or downward. The tires are, in fact, attached to a different frame which is not moved at a distance away from the soil. These tires are not in contact with the soil independent of a position of the discs. Moreover, *Kinzenbaw et al.* does not disclose discs on opposite sides of the tires.

Claim 30, as amended, requires an apparatus for separating soil having a frame. An axle is associated with the frame wherein the axle serves as a fulcrum wherein the frame pivots with respect to the axle. In *Kinzenbaw et al.*, the frame does not pivot with respect to the axle wherein the axle serves as a fulcrum for the frame.

Under 35 U.S.C. §102(b), anticipation requires that a single reference discloses each and every element of Applicant's claimed invention. *Akzo N.V. v. U.S. International Trade Commission*, 808 F.2d 1471, 1479, 1 USPQ 2d 1241, 1245 (Fed. Cir. 1986).

Moreover, anticipation is not shown even if the differences between the claims and the reference are "insubstantial" and one skilled in the art could supply the missing elements. *Structure Rubber Products Co. v. Park Rubber Co.*, 749 F.2d. 707, 716, 223

USPQ 1264, 1270 (Fed. Cir. 1984).

Because *Kinzenbaw et al.* fail to disclose each and every element of independent Claims 24, 28 and 30, the rejection of these claims under 35 U.S.C. §102(b) is improper and should be withdrawn. Notice to that effect is requested.

The Patent Office rejected Claims 22 and 31 under 35 U.S.C. §103(a) as being unpatentable over *Kinzenbaw et al.* in view of *Taylor et al.* (U.S. Patent No. 4,725,068). In the Office Action, the Patent Office alleged:

"*Kinzenbaw et al.* disclose an apparatus as described previously, including a hitch 18. *Kinzenbaw et al.*, however lacks specifying that a connector that rotates 360 degrees, is used with the hitch. *Kinzenbaw et al.*, does however show holes in the hitch that are used to connect the hitch to a towing vehicle (fig. 1a).

Taylor et al. teach that it is known in the art to use a pin 84 to connect an implement frame to a tow vehicle. Pins are used as connecting devices as they allow for quick and easy connections. The examiner notes that although a tightened bolt often cannot be rotated, a pin such as the ones used with agricultural devices to provide quick connections can in fact rotate 360 degrees. Therefore, the use of a connecting pin that can rotate 360 degrees within its' aperture would meet the claimed limitation of the connector rotating 360 degrees."

Independent Claim 22, as amended, requires an apparatus for separating soil having a frame having a length defined between a first end and a second end. A plurality of discs are attached to the frame adjacent to the first end wherein the cylinder moves the frame wherein movement of the second end in a downward direction causes the discs to move in a direction opposite to the downward direction of the second end. Neither *Kinzenbaw et al.* nor *Taylor*

et al., taken either singly or in combination, teach or suggest a frame moved by a cylinder wherein movement of the second end in a downward direction causes the discs to be moved in a direction opposite to the downward direction of the second end. In *Kinzenbaw et al.*, the first end of the frame and the second end of the frame remain an equal distance from the soil. *Taylor et al.* provide no teaching or suggestion of a frame which moves wherein movement of the second end in a downward direction causes the discs attached adjacent to the first end to be moved in a direction opposite to the downward direction of the second end.

Independent Claim 31, as amended, defines an apparatus for separating soil having a frame. An axle is associated with the frame wherein the axle serves as a fulcrum wherein the frame pivots with respect to the axle. Neither *Kinzenbaw et al.* nor *Taylor et al.*, taken either singly or in combination, teach or suggest a frame pivoting with respect to an axle wherein the axle serves as a fulcrum for the frame. In *Kinzenbaw et al.*, the axle does not serve as a fulcrum for pivoting of the frame. *Taylor et al.* provide no teaching or suggestion of a frame which moves with respect to an axle.

It is submitted that the question under §103 is whether the totality of the art would collectively suggest the claimed invention to one of ordinary skill in this art. In re Simon, 461 F.2d 1387, 174 USPQ 114 (CCPA 1972).

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the art is alone insufficient. It is common to find elements somewhere in the art. Moreover, most if not all elements perform their ordained and expected functions. The test is whether the invention as a whole, in light of the teachings of the references in their entireties, would have been obvious to one of ordinary skill in the art at the time the invention was made. Connell v. Sears, Roebuck & Co., 722 F.2d 1542, 220 USPQ 193 (Fed. Cir. 1983).

It is insufficient that the art disclosed components of Applicant's invention, either separately or used in other combinations. A teaching, suggestion, or incentive must exist to make the combination made by Applicant. Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1143, 227 USPQ 543, 551 (Fed. Cir. 1988).

In view of the foregoing remarks and amendments, Applicant respectfully submits the rejections of Claims 22 and 31 under 35 U.S.C. §103(a) have been overcome and should be withdrawn. Notice to that effect is requested.

Claims 2-9 depend from Claim 1. These claims are further believed allowable over the references of record for the same reasons set forth with respect to their parent claim since each sets forth additional structural elements of Applicant's hydraulic disc/harrow apparatus.

In view of the foregoing remarks and amendments, Applicant respectfully submits that all of the claims in the application are in allowable form and that the application is now in condition for allowance. Further, Applicant submits that neither further search

nor consideration would be necessitated by entry of this Amendment; therefore, entry of this Amendment is proper and should be effected.

If, however, any outstanding issues remain, Applicant urges the Patent Office to telephone Applicant's attorney so that the same may be resolved and the application expedited to issue. Applicant requests the Patent Office to indicate all claims as allowable and to pass the application to issue.

Respectfully submitted,

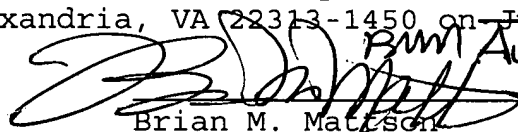


(Reg. No. 35,018)

Brian M. Mattson
Patents+TMS
A Professional Corporation
1914 North Milwaukee Avenue
Chicago, Illinois 60647
Telephone: (773) 772-6009
Attorney for Applicant

CERTIFICATE OF MAILING

I hereby certify that this **Amendment After Final** is being deposited with the United States Postal Service as First Class Mail in an envelope addressed to Mail Stop AF, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on ~~July~~ ^{Print August} 04, 2004.



Brian M. Mattson